

CLAIMS

1. Vehicle clutch (6) located in a vehicle between a prime mover (2) and a transmission (4) and controlled according to the rotational speed of the prime mover (2) having elements (26, 32) which cause a variable torque transmission according to the rotational speed of the prime mover (2), characterized in that said vehicle clutch (6) is actuatable without externally actuated actuator.

2. Vehicle clutch (6) according to claim 1, characterized in that said vehicle clutch (6) is the only clutch situated between prime mover (2) and transmission (4) and is provided as a starting clutch without possibility of traction interruption during shifting operations.

3. Vehicle clutch (6) according to claim 1 or 2, characterized in that devices (36, 44, 52) are provided for monitoring the rotational speed of a part on the input side (18) and a part on the output side (10) of the vehicle clutch (6).

4. Vehicle clutch (6) according to any one of claims 1 to 3, characterized in that for calculating the friction work of said vehicle clutch (6), an electronic control device (16) is provided which is connected with said devices (36, 44, 52) for monitoring the rotational speed.

5. Vehicle clutch (6) according to claim 4, characterized in that in the electronic control device (16) a characteristic field is stored by way of which the rotational speed of the prime mover (2) can be influenced and which comprises the relationships of values for accelerator pedal position, injection amount and engine rotational speed.

6. Vehicle clutch (6) according to any one of claims 1 to 5, characterized in that the elements (26, 32) which cause the torque transmission have kinematics which can be influenced according to vehicle weight or tractional resistance.

7. Vehicle clutch (6) according to claim 6, characterized in that the kinematics comprises changeable lever elements, the changeable lever ratios of which serve for control of the capacity for torque transmission of said vehicle clutch (6).

8. Vehicle clutch (6) according to claim 7, characterized in that the lever ratios on the lever elements can be electromotively, electromagnetically, hydraulically or pneumatically changed by displacement of the reversal points on the levers.

9. Vehicle clutch (6) according to any one of claims 1 to 8, characterized in that said vehicle clutch has a wear compensation.

10. Vehicle clutch (6) according to claim 9, characterized in that the changeable elements of the lever are provided for compensation to the wear.

11. Vehicle clutch (6) according to any one of claims 4 to 10, characterized in that said electronic control device (16) of said vehicle clutch (6) is integrated in a control device of said transmission (16) or of the whole vehicle.

12. Utilization of the vehicle clutch (6) according to claims 1 to 11 between a prime mover (2) and an automated vehicle transmission (4).